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| APPLICATION NO.                                       | FILING DATE   | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO.   | CONFIRMATION NO. |
|---|---|----------------------|-----------------------|------------------|
| 10/695,056  | 10/28/2003  | David B. Lection     | RSW920030183US1 (606) | 5961             |
|   | 320 7590 03/12/2012<br>AREY, RODRIGUEZ, GREENBERG & O''KEEFE, LLP |                      | EXAMINER              |                  |
| STEVEN M. GREENBERG<br>950 PENINSULA CORPORATE CIRCLE |   |                      | ZHE, MENG YAO         |                  |
| SUITE 2022  | LA CORPORATE CIR  | CLE                  | ART UNIT              | PAPER NUMBER     |
| BOCA RATON  | I, FL 33487   |                      | 2195                  |                  |
|   |   |                      |                       |                  |
|   |   |                      | MAIL DATE             | DELIVERY MODE    |
|   |   |                      | 03/12/2012            | PAPER            |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

|  | Application No.   | Applicant(s)        |                |  |  |  |
|--|---|---------------------|----------------|--|--|--|
| Office Action Comments   | 10/695,056  | LECTION ET AL.      |                |  |  |  |
| Office Action Summary  | Examiner  | Art Unit            |                |  |  |  |
|  | MENGYAO ZHE   | 2195                |                |  |  |  |
| The MAILING DATE of this communication app<br>Period for Reply   | ears on the cover sheet with the c  | orrespondence ad    | ldress         |  |  |  |
| A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b). |   |                     |                |  |  |  |
| Status   |   |                     |                |  |  |  |
| 1) Responsive to communication(s) filed on 10 Ma   | arch 2010.  |                     |                |  |  |  |
| ,  | action is non-final.  |                     |                |  |  |  |
| 3) An election was made by the applicant in response   |   | set forth during th | e interview on |  |  |  |
|  | ; the restriction requirement and election have been incorporated into this action.                     |                     |                |  |  |  |
| 4) Since this application is in condition for allowan  | ·   |                     | e merits is    |  |  |  |
| closed in accordance with the practice under E   | x parte Quayle, 1935 C.D. 11, 45  | 3 O.G. 213.         |                |  |  |  |
| Disposition of Claims  |   |                     |                |  |  |  |
| 5) Claim(s) <u>24-41</u> is/are pending in the application   | l.  |                     |                |  |  |  |
| 5a) Of the above claim(s) is/are withdraw  | n from consideration.   |                     |                |  |  |  |
| 6) Claim(s) is/are allowed.  |   |                     |                |  |  |  |
| 7)⊠ Claim(s) <u>24-41</u> is/are rejected.   | ·   |                     |                |  |  |  |
| 8) Claim(s) is/are objected to.  |   |                     |                |  |  |  |
| 9) Claim(s) are subject to restriction and/or  |   |                     |                |  |  |  |
| Application Papers   |   |                     |                |  |  |  |
| 10) The specification is objected to by the Examiner   | ·.  |                     |                |  |  |  |
| 11) The drawing(s) filed on is/are: a) acce  |   | Examiner.           |                |  |  |  |
| - · · · · · · · · · · · · · · · · · · ·  | Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). |                     |                |  |  |  |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).   |   |                     |                |  |  |  |
| 12) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.   |   |                     |                |  |  |  |
| Priority under 35 U.S.C. § 119   |   |                     |                |  |  |  |
| 13) Acknowledgment is made of a claim for foreign  | oriority under 35 LLS C - 8 119(a)  | -(d) or (f)         |                |  |  |  |
| a) All b) Some * c) None of:   | 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).         |                     |                |  |  |  |
| <u> </u>   |   |                     |                |  |  |  |
| 2. Certified copies of the priority documents have been received in Application No   |   |                     |                |  |  |  |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage  |   |                     |                |  |  |  |
| application from the International Bureau (PCT Rule 17.2(a)).  |   |                     |                |  |  |  |
| * See the attached detailed Office action for a list of the certified copies not received.   |   |                     |                |  |  |  |
|  | or and continued copies that is continued in  | <b>-</b>            |                |  |  |  |
| Attachment(s)  |   |                     |                |  |  |  |
| 1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)  |   |                     |                |  |  |  |
| 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  | Paper No(s)/Mail Da   |                     |                |  |  |  |
| B) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date  5) Notice of Informal Patent Application  Other:  |   |                     |                |  |  |  |
|  |   |                     |                |  |  |  |

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## **DETAILED ACTION**

1. Claims 24-41 are presented for examination.

#### Continued Examination Under 37 CFR 1.114

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/10/2010 has been entered.

## Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 24-27, 29-33, 35-39, 41 are rejected under 35 U.S.C. 103(a) as being unpatentable over of McCarthy et al., Patent No., 7,140,020 (hereafter McCarthy) in view of Trossman et al., Pub. No. 2003/0149685 (hereafter Trossman).

McCarthy and Trossman were cited in the previous office action.

As per claims 24, 30, 36, McCarthy teaches a method, performed by a computer hardware system, of managing a set of processes and a set of resources within the computer hardware system, comprising:

identifying, from the set of processes within the computer hardware system, a plurality of lagging processes (Column 3, lines 8-12, lines 23-28, lines 39-42);

identifying, from the set of resources within the computer hardware system, a plurality of available resources that are available for use by the plurality of lagging processes (Column 4, lines 25-35: it is inherent that the system knows what resources are available for allocation);

calculating, for a particular one of the plurality of lagging processes, if resources should be allocated;

assigning, within the computer hardware system and based upon the calculation, the particular one of the plurality of available resources to a selected one of the lagging processes.

McCarthy does not specifically teach calculating, for a particular one of the plurality of lagging processes, a calculated benefit to be realized upon a particular one of the plurality of available resources being assigned to the particular one of the plurality of lagging processes; comparing the calculated benefit for the particular one of the plurality of lagging processes with other calculated benefits for others of the plurality of lagging processes being assigned the particular one of the plurality of available resources; and assigning, within the computer hardware system and based upon the

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comparing, the particular one of the plurality of available resources to a selected one of the lagging processes.

However, Trossman teaches calculating, for a particular one of the plurality of processes, a calculated benefit to be realized upon a particular one of the plurality of available resources being assigned to the particular one of the plurality of processes (Para 93, 95-96: the preference value corresponds to the benefit value because the preference value indicates things like the amount of processing power that would be gained if the resource is assigned and how likely the process is able to meet its objectives if the resources are given); comparing the calculated benefit for the particular one of the plurality of processes with other calculated benefits for others of the plurality of processes being assigned the particular one of the plurality of available resources; and assigning, within the computer hardware system and based upon the comparing, the particular one of the plurality of available resources to a selected one of the processes (Para 91, 92, 100-101: the process of weighting each branch and comparing preference values is the process of comparing benefit values) for the purpose of optimizing resource allocation.

It would have been obvious to one having ordinary skill in the art at the time of the invention to modify the teachings of McCarthy with the specifics of calculating, for a particular one of the plurality of processes, a calculated benefit to be realized upon a particular one of the plurality of available resources being assigned to the particular one of the plurality of processes; comparing the calculated benefit for the particular one of the plurality of processes with other calculated benefits for others of the plurality of

processes being assigned the particular one of the plurality of available resources; and assigning, within the computer hardware system and based upon the comparing, the particular one of the plurality of available resources to a selected one of the processes, as taught by Trossman, such that the assigning resource to lagging processes may also benefit by the teachings of Trossman, because it helps to optimize resource allocation.

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- 4. As per claims 25, 31, 37, Trossman teaches wherein the selected one of the processes is a most responsive process to the particular one of the plurality of available resources (Para 101-102).
- 5. As per claim 26, 32, 38, Trossman teaches executing the selected one of the lagging processes using the particular one of the plurality of available resources (Para 106).
- 6. As per claims 27, 33, 39, McCarthy teaches identifying, from the set of processes within the computer hardware system, an accelerated process; and reassigning a resource, from the accelerated process, to the selected one of the lagging processes (Column 3, lines 40-46).
- 7. As per claims 29, 35, 41, Trossman teaches wherein the calculated benefit for the particular one of the plurality of lagging processes includes a calculated saved time between (i) the particular one of the plurality of lagging processes being assigned the particular one of the available resources, and (ii) the particular one of the plurality of

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lagging processes not being assigned the particular one of the available resources (Para 80).

8. Claims 28, 34, 40, are rejected under 35 U.S.C. 103(a) as being unpatentable over of McCarthy et al., Patent No., 7,140,020 (hereafter McCarthy) in view of Trossman et al., Pub. No. 2003/0149685 (hereafter Trossman), as applied to claim 1 above, further in view of Delp et al., Patent No. 5,996,013 (hereafter Delp).

- 9. Delp was cited in the previous office action.
- 10. As per claims 28, 34, 40, Delp teaches wherein the calculating is based upon a benefit knowledge database.

# Response to Arguments

- 11. Applicant's arguments filed on 3/10/2010 have been fully considered but are not persuasive.
- 12. In the remark, the applicant argued that:
  - i) Trossman does not teach allocation of resources based on the anticipated benefits.

The Examiner respectfully disagree with the applicant. As to point:

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i) As stated in the rejection above, Para 93, 95-96 of Trossman teaches preference values. The preference value corresponds to the benefit value because the preference value indicates how the system would change if the resources were provided. It includes things like the amount of processing power that would be gained if the resource is assigned and how likely the process is able to meet its objectives if the resources are given. Resources are then allocated based on the preference values.

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### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to MENGYAO ZHE whose telephone number is (571)272-6946. The examiner can normally be reached on Monday Through Friday, 7:30 - 5:00 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Meng-Ai An can be reached on 571-272-3756. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Mengyao Zhe/